

Fig.1

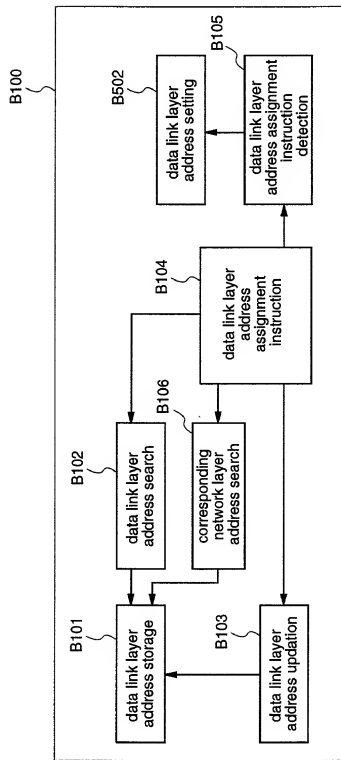


Fig. 2

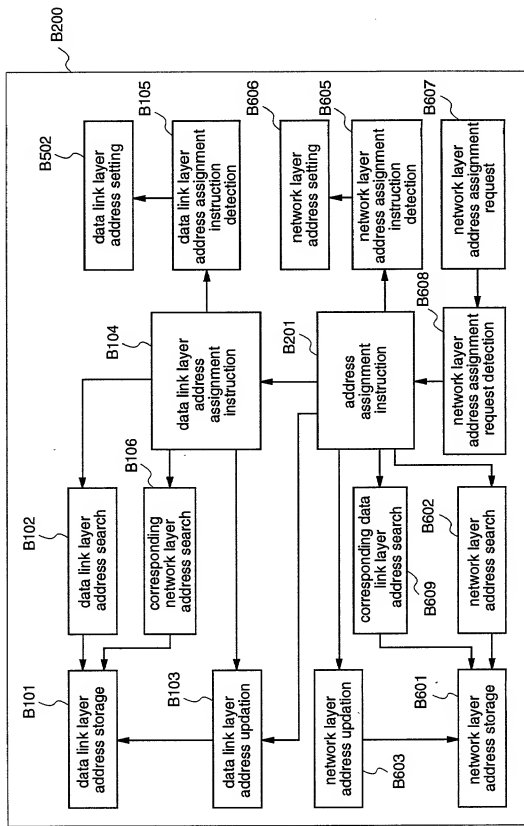


Fig. 3

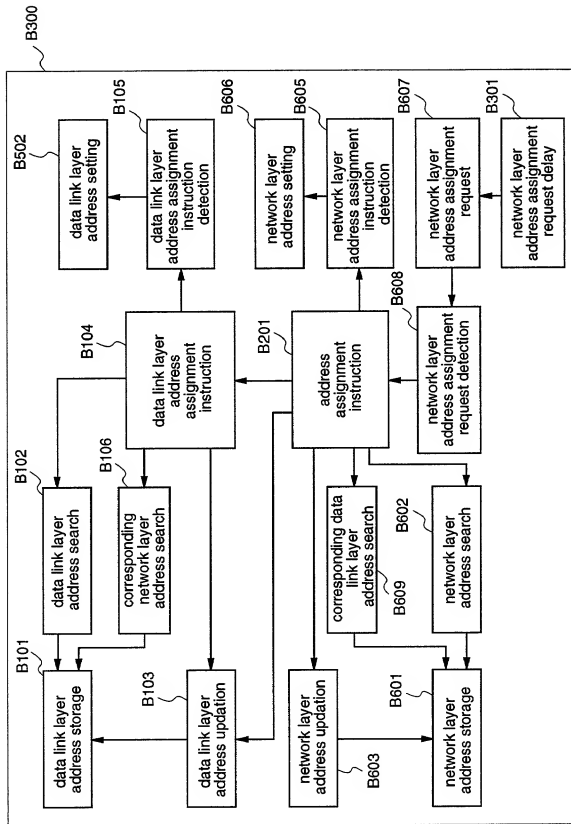


Fig.4

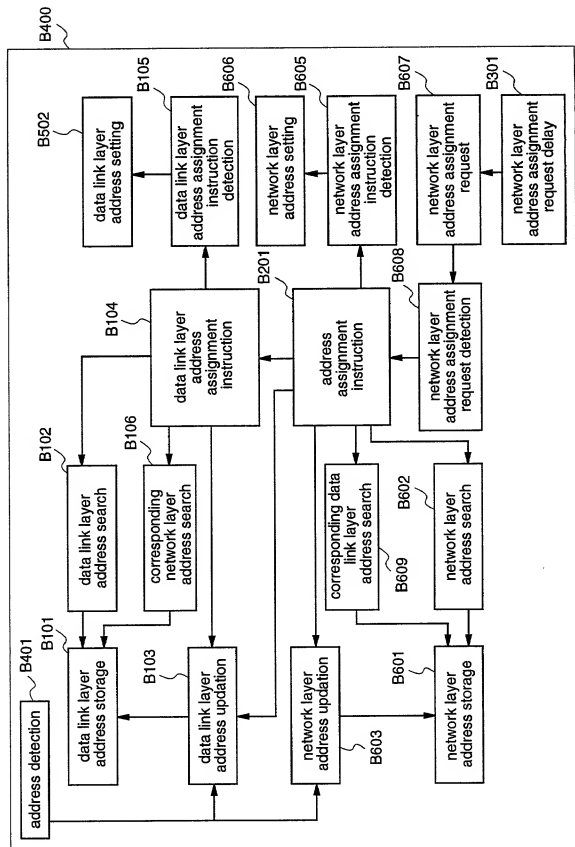


Fig.5 Prior Art

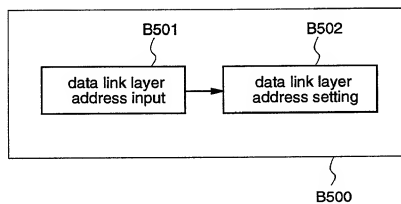


Fig.6 Prior Art

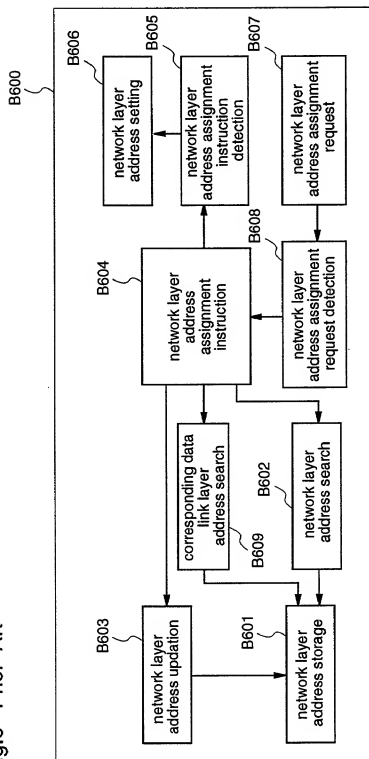


Fig.7

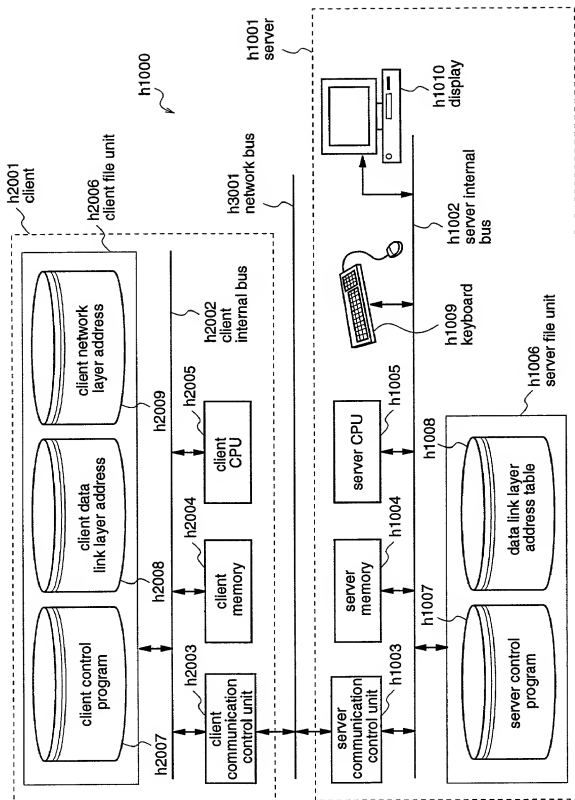


Fig.8

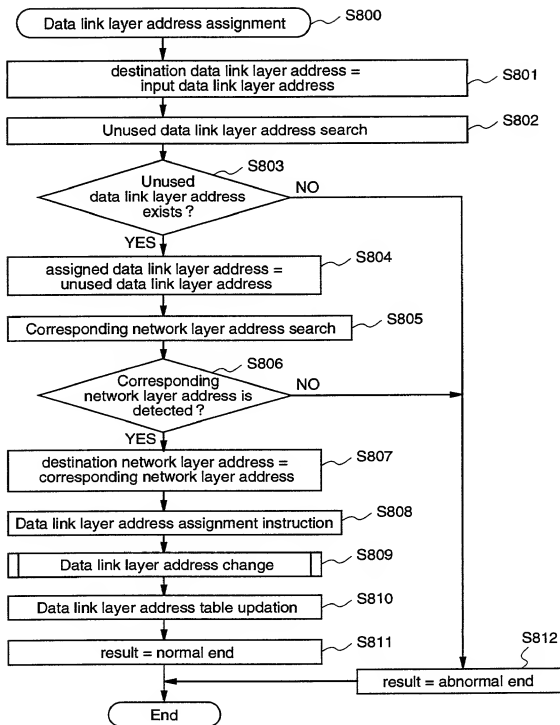




Fig.9

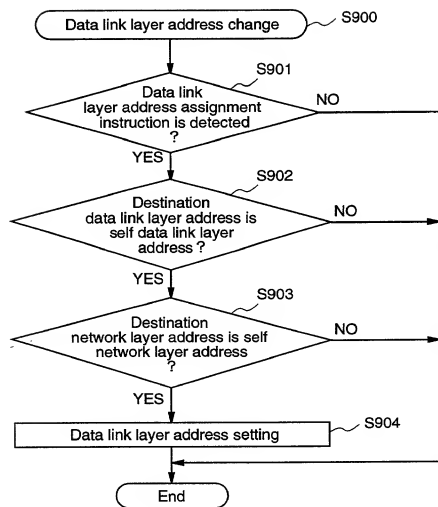


Fig.10(A)

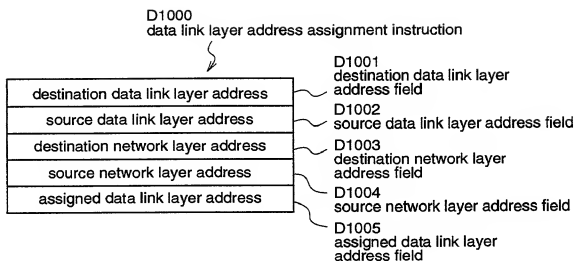


Fig.10(B)

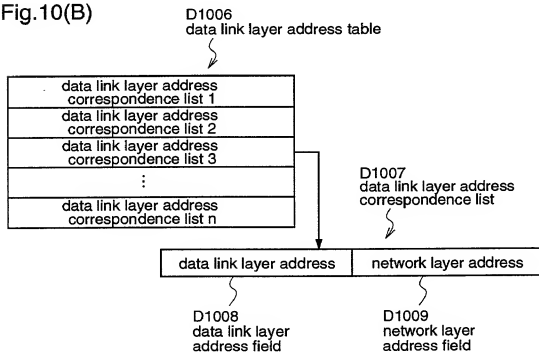


Fig.11

(a1) address state of server

network layer address	data link layer address
NA1	DA1

(a2) address state of server

network layer address	data link layer address
NA1	DA1

(b1) address state of client 1

network layer address	data link layer address
NA2	DA2

(b2) address state of client 1

network layer address	data link layer address
NA2	DA3

(d1) data link layer  
address table

data link layer address	network layer address
DA1	NA1
DA2	NA2
DA3	NULL
DA4	NULL

(d2) data link layer  
address table

data link layer address	network layer address
DA1	NA1
DA2	NULL
DA3	NA2
DA4	NULL

Fig. 12

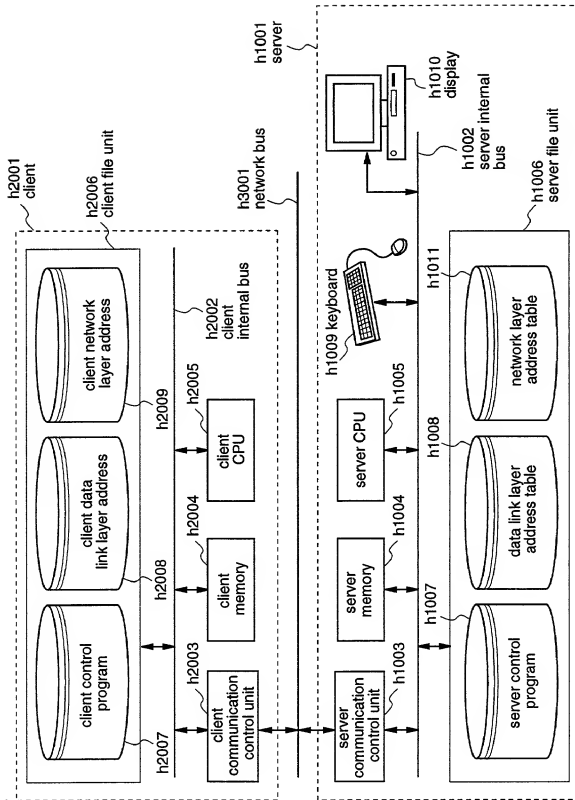


Fig.13

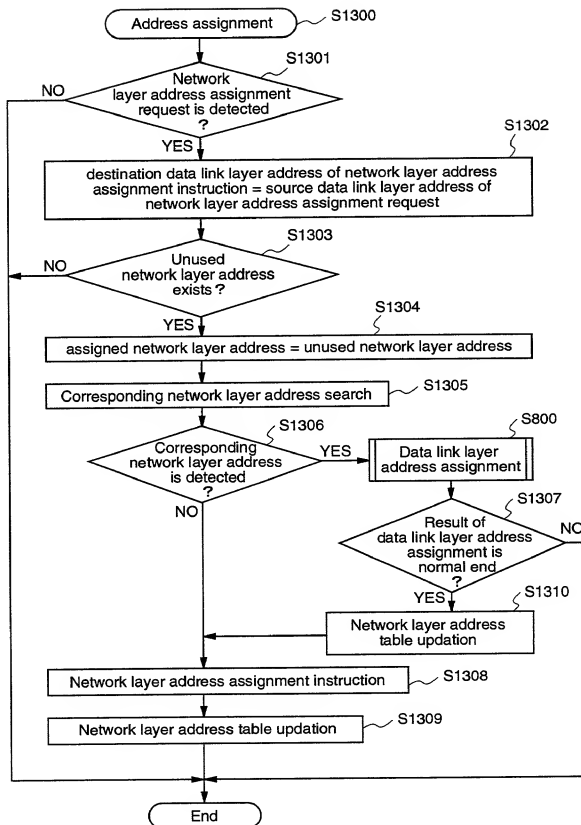


Fig.14

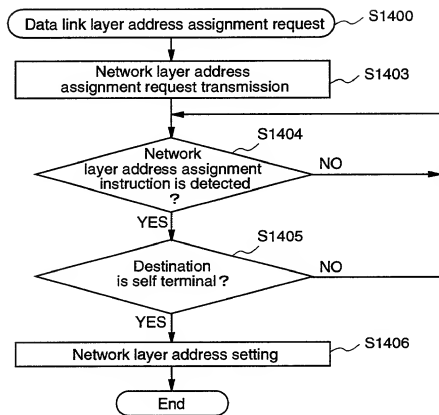


Fig.15 (A)

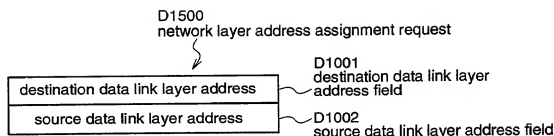


Fig.15 (B)

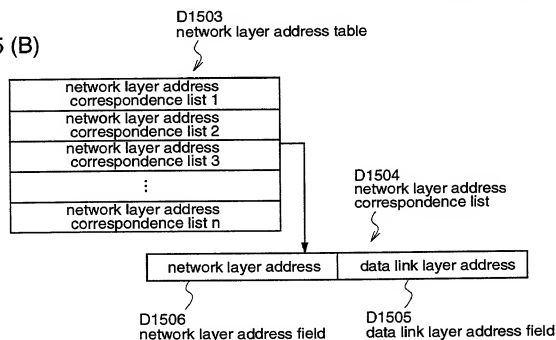


Fig.15 (C)

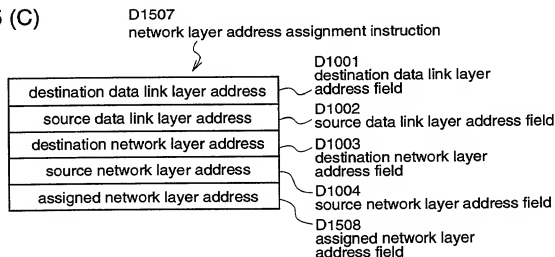


Fig.16

(a1)address state of server

network layer address	data link layer address
NA1	DA1

(b1)address state of client 1

network layer address	data link layer address
NA2	DA2

(c1)address state of client 2

network layer address	data link layer address
NULL	DA2

(d1)data link layer address table

data link layer address	network layer address
DA1	NA1
DA2	NA2
DA3	NULL
DA4	NULL

(e1)network layer address table

network layer address	data link layer address
NA1	DA1
NA2	DA2
NA3	NULL
NA4	NULL

(a2)address state of server

network layer address	data link layer address
NA1	DA1

(b2)address state of client 1

network layer address	data link layer address
NA2	DA3

(c2)address state of client 2

network layer address	data link layer address
NULL	DA2

(d2)data link layer address table

data link layer address	network layer address
DA1	NA1
DA2	NULL
DA3	NA2
DA4	NULL

(e2)network layer address table

network layer address	data link layer address
NA1	DA1
NA2	DA3
NA3	NULL
NA4	NULL

(a3)address state of server

network layer address	data link layer address
NA1	DA1

(b3)address state of client 1

network layer address	data link layer address
NA2	DA3

(c3)address state of client 2

network layer address	data link layer address
NA3	DA2

(d3)data link layer address table

data link layer address	network layer address
DA1	NA1
DA2	NA3
DA3	NA2
DA4	NULL

(e3)network layer address table

network layer address	data link layer address
NA1	DA1
NA2	DA3
NA3	DA2
NA4	NULL



Fig.17

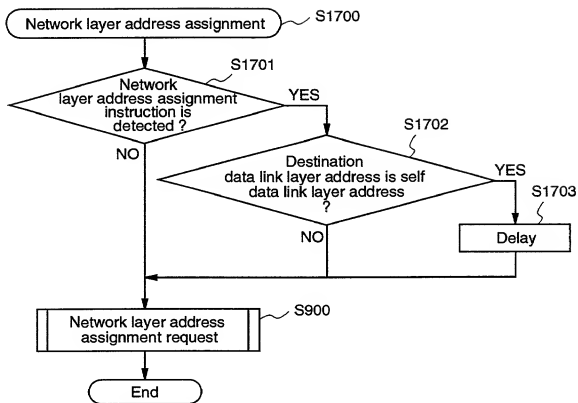


Fig. 18

(a1) address state of server				(a2) address state of server				(a3) address state of server				(a4) address state of server			
network layer address	data link layer address	DA1		network layer address	data link layer address	DA1		network layer address	data link layer address	DA1		network layer address	data link layer address	DA1	
NA1				NA1				NA1				NA1			

(b1) address state of client 1				(b2) address state of client 1				(b3) address state of client 1				(b4) address state of client 1			
network layer address	data link layer address	DA2		network layer address	data link layer address	DA2		network layer address	data link layer address	DA3		network layer address	data link layer address	DA3	
NULL				NA2				NA2				NA2			

(c1) address state of client 2				(c2) address state of client 2				(c3) address state of client 2				(c4) address state of client 2			
network layer address	data link layer address	DA2		network layer address	data link layer address	DA2		network layer address	data link layer address	DA2		network layer address	data link layer address	DA2	
NULL				NULL				NULL				NA3			

(d1) data link layer address table				(d2) data link layer address table				(d3) data link layer address table				(d4) data link layer address table			
data link layer address	network layer address			data link layer address	network layer address			data link layer address	network layer address			data link layer address	network layer address		
DA1	NA1			DA1	NA1			DA1	NA1			DA1	NA1		
DA2	NULL			DA2	NA2			DA2	NULL			DA2	NA2		
DA3	NULL			DA3	NULL			DA3	NA2			DA3	NA2		
DA4	NULL			DA4	NULL			DA4	NULL			DA4	NULL		

(e1) network layer address table				(e2) network layer address table				(e3) network layer address table				(e4) network layer address table			
network layer address	data link layer address			network layer address	data link layer address			network layer address	data link layer address			network layer address	data link layer address		
NA1	DA1			NA1	DA1			NA1	DA1			NA1	DA1		
NA2	NULL			NA2	DA2			NA2	DA3			NA2	DA3		
NA3	NULL			NA3	NULL			NA3	NULL			NA3	DA2		
NA4	NULL			NA4	NULL			NA4	NULL			NA4	NULL		

Fig.19

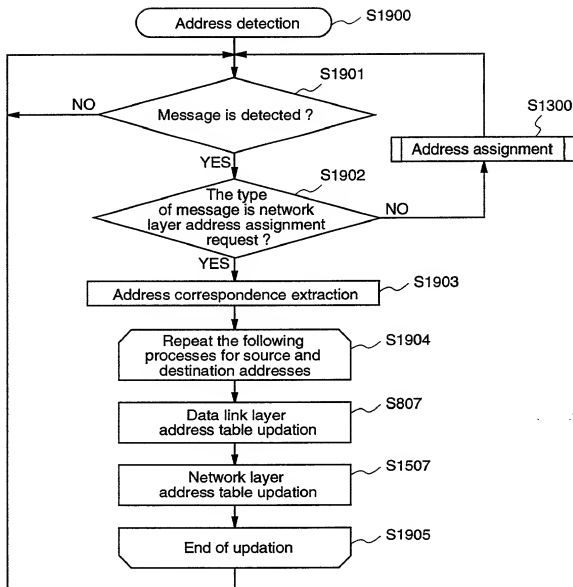


Fig.20

(a1)address state of server	(a2)address state of server	(a3)address state of server
network layer address	network layer address	network layer address
NA1	NA1	NA1
data link layer address	data link layer address	data link layer address
DA1	DA1	DA1

(b1)address state of client 1	(b2)address state of client 1	(b3)address state of client 1
network layer address	network layer address	network layer address
NA3	NA3	NA3
data link layer address	data link layer address	data link layer address
DA3	DA3	DA3

(c1)address state of client 2	(c2)address state of client 2	(c3)address state of client 2
network layer address	network layer address	network layer address
NA2	NA2	NA2
data link layer address	data link layer address	data link layer address
DA3	DA3	DA3

(d1)data link layer address table	(d2)data link layer address table	(d3)data link layer address table
data link layer address	data link layer address	data link layer address
DA1	DA1	DA1
DA2	DA2	DA2
DA3	DA3	DA3
DA4	DA4	DA4
network layer address	network layer address	network layer address
NA1	NA1	NA1
NA2	NA2	NULL
NULL	NA3	NA2
NULL	NULL	NULL

(e1)network layer address table	(e2)network layer address table	(e3)network layer address table
network layer address	network layer address	network layer address
NA1	NA1	NA1
NA2	NA2	NA2
NA3	NA3	NA3
NA4	NA4	NA4
data link layer address	data link layer address	data link layer address
DA1	DA1	DA1
DA2	DA2	DA3
NULL	DA3	NULL
NULL	NULL	NULL

Fig.21 Prior Art

